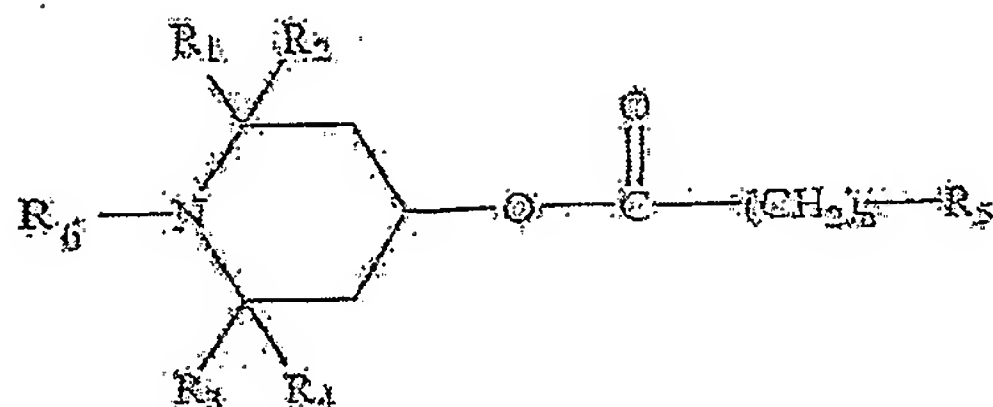


CLAIMS

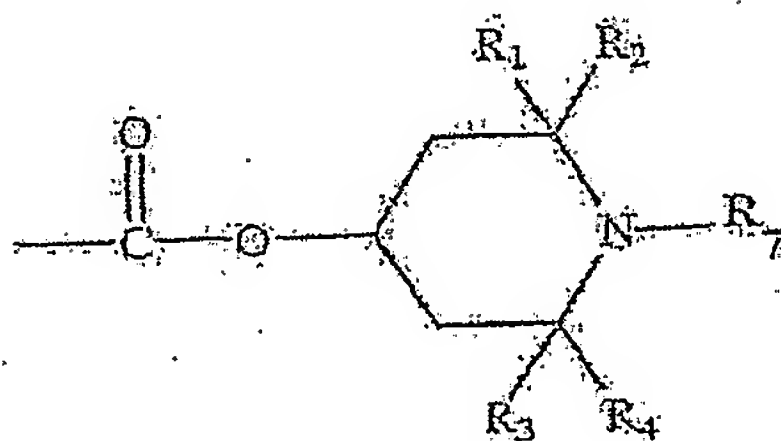
1. Use of a compound of formula:



in which:

R<sub>6</sub> is oxyl, hydrogen or hydroxyl, R<sub>1</sub>, R<sub>2</sub>, R<sub>3</sub> and R<sub>4</sub> are selected independently of one another from:

- hydrogen
- alkyl having from 1 to 12 carbon atoms,
- alkenyl having from 2 to 12 carbon atoms,
- alkynyl with from 2 to 12 carbon atoms, or
- R<sub>1</sub> and R<sub>2</sub> together are tetramethylene or pentamethylene;
- R<sub>5</sub> is hydrogen,
- alkyl having from 1 to 12 carbon atoms,
- cycloalkyl having from 3 to 8 carbon atoms,
- alkenyl with from 2 to 12 carbon atoms,
- alkynyl having from 2 to 12 carbon atoms, or



(II)

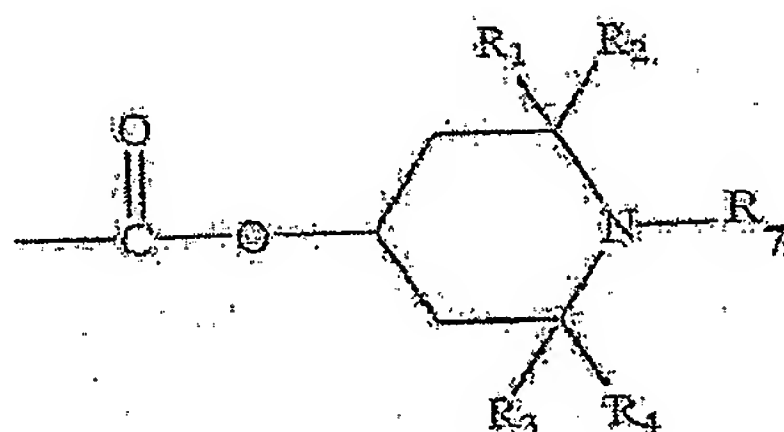
in which:

R<sub>1</sub>, R<sub>2</sub>, R<sub>3</sub> and R<sub>4</sub> are as defined above,

R<sub>7</sub> is the same as or different from R<sub>6</sub> and is selected from hydrogen, oxyl or hydroxyl, and

n is a whole number from 1 to 30,  
for the preparation of a pharmaceutical composition for  
veterinary or human use or of a medicament for the  
therapeutic or prophylactic treatment of neurodegenerative  
diseases.

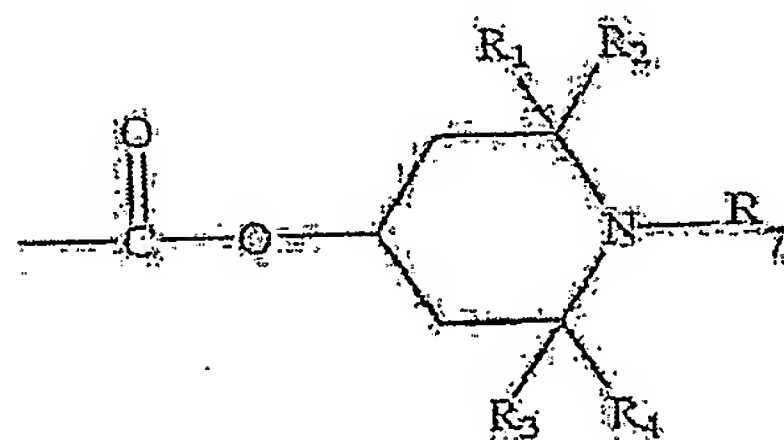
2. Use according to Claim 1 in which, in formula (I),  $R_1$ ,  $R_2$ ,  $R_3$  and  $R_4$  are, independently of one another, an alkyl having from 1 to 6 carbon atoms,  $R_6$  is hydrogen, oxyl or hydroxyl, and  $R_5$  is:



(II)

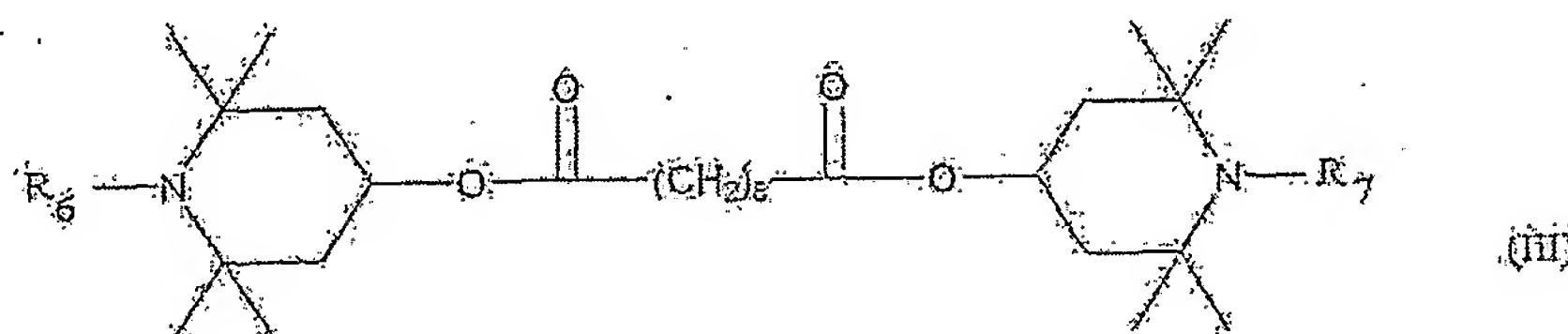
in which  $R_1$ ,  $R_2$ ,  $R_3$  and  $R_4$ , independently of one another, are an alkyl having from 1 to 6 carbon atoms,  $R_7$  is oxyl, hydrogen or hydroxyl, and n is a whole number from 2 to 14.

3. Use according to Claim 1 or Claim 2 in which  $R_1$ ,  $R_2$ ,  $R_3$  and  $R_4$  are, independently of one another, an alkyl having from 1 to 3 carbon atoms and  $R_5$  is:



in which  $R_1$ ,  $R_2$ ,  $R_3$  and  $R_4$  are, independently of one another, an alkyl having from 1 to 3 carbon atoms,  $R_7$  is oxyl, hydrogen or hydroxyl, and  $n$  is a whole number from 6 to 10.

4. Use according to any one of Claims 1 to 3 in which the compound is of formula:



in which  $R_6$  and  $R_7$  are identical or different and are selected from oxyl, hydrogen and hydroxyl.

5. Use according to any one of Claims 1 to 4 in which the neurodegenerative disease is selected from Parkinson's disease, Alzheimer's disease, brain lesion due to ischaemia-reperfusion, traumatic brain lesion, neuropathy due to HIV, Down's syndrome, diabetic polyneuropathy, muscular dystrophy, multiple sclerosis, Huntington's disease, prion disease, late dyskinesia, tauopathy, demyelinating pathologies and Lou Gherig's syndrome.

6. Use of a compound as identified in any one of Claims 1 to 4 for the treatment of pathologies selected from lesions due to ischaemia-reperfusion in the heart, kidneys, lungs, liver and intestine, hypertension, diabetes, cancer, shock, cystic fibrosis, virus infections, toxicity due to drugs or radiation (radiotherapy or radiation protection), inflammation, epilepsy, atherosclerosis, aging, hyperlipidaemia, hypercholesterolaemia, rheumatoid arthritis and for the treatment of pain or sepsis.

7. Use according to any one of the preceding claims in which the pharmaceutical or veterinary composition or medicament is suitable for oral, parenteral, inhalatory or topical administration.

8. Use according to any one of the preceding claims in which the pharmaceutical or veterinary composition or medicament is in a dosage form suitable for administration of the compound in quantities of from 0.01 to 200 mg/kg of body weight, preferably from 0.5 to 20 mg/kg of body weight.

9. Pharmaceutical compositions comprising an effective anti-oxidizing quantity of a compound of formula (I) as defined in any one of Claims 1 to 4 in which  $R_6$  is hydrogen or oxyl and  $R_7$ , if present, is identical to or different from  $R_6$  and is selected from oxyl, hydrogen and hydroxyl, and a vehicle which is physiologically acceptable for administration to man or to animals.

10. A pharmaceutical composition comprising an effective anti-oxidizing quantity of a compound of formula (I) as defined in Claim 1 in which  $R_5$  is a group of formula (II) and in which  $R_6$  and  $R_7$  are selected, independently of one another, from hydrogen, oxyl and hydroxyl, provided that both  $R_6$  and  $R_7$  are not hydroxyl, and a vehicle which is physiologically acceptable for administration to man or to animals.